

An Energy Efficiency Workshop & Exposition

Kansas City, Missouri



The Hidden Challenges of Energy Deregulation







What are the challenges?

What Deregulation Means:

- » New Requirements...
- » New Players…
- » New Territories...
- » ...Same Users

New Thinking





The Change from Regulation

New Thinking:

- What is truly needed to manage energy in a deregulated world?
- Are there elements beyond \$/kWh?
- What plant and equipment is best and suitable?
- Are there administrative challenges?
- How does one capitalize on the spot market opportunities?
- How can one staff for these challenges?





Deregulation Timing

More New Thinking:

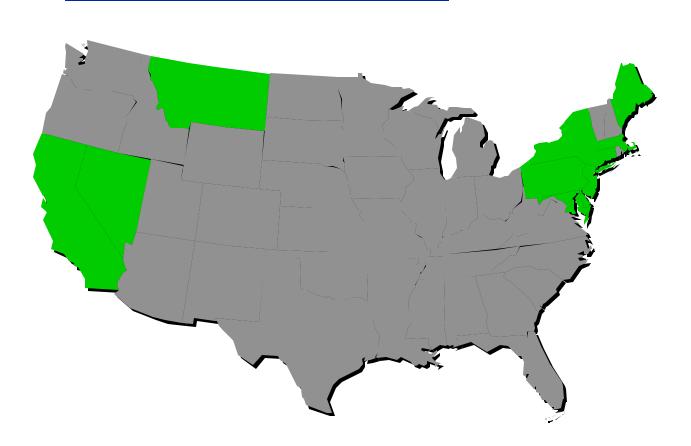
- When will this occur?
- Where will it occur?
- How will it occur?







Deregulated Now

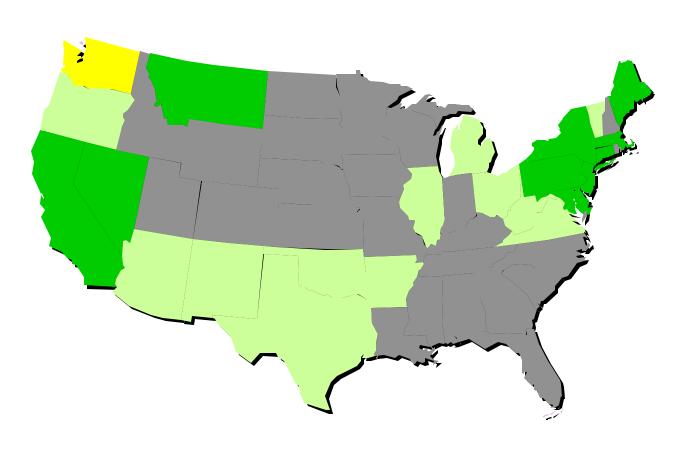








The Future of Deregulation

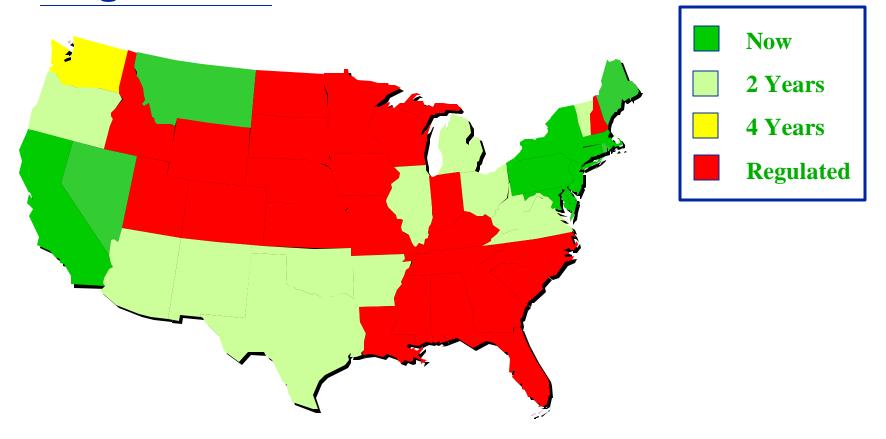








Regulated

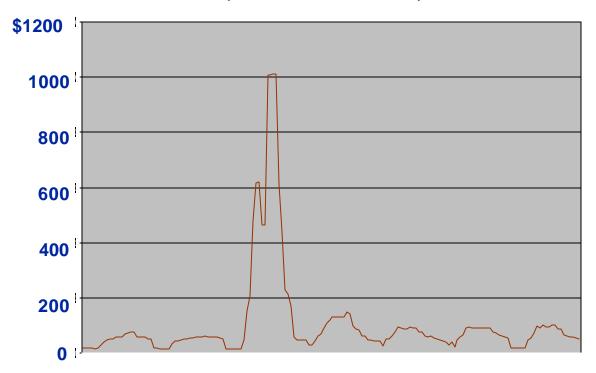






Changing Energy Marketplace

Electricity Price Volatility - Sample Hourly Prices (6/24/00 - 6/30/00)







Keeping Up With the Changes

How does a company keep up with all the required information to effectively manage the complete energy process?





Understanding the difference between

Information Technology

and the

Technology of Information

is the

fundamental necessity

for the success of deregulation.





Transferring the Technology

The well-positioned ESCO has that technology and has the experience.

But it resides in the wrong place.





Transferring is the Key

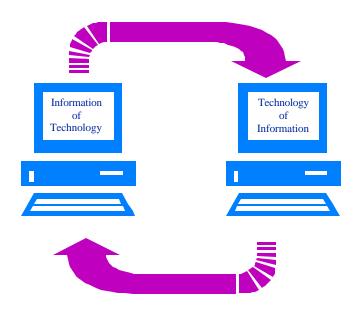






The Management of the Process

INFORMATION TECHNOLOGY is the management of the process of moving information from point to point.



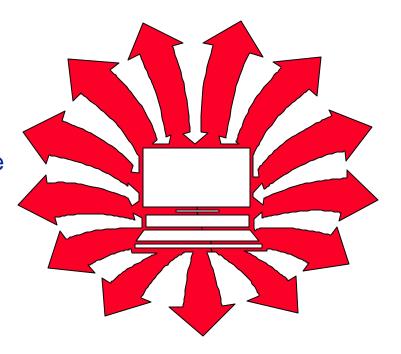




The Power of Information

But the <u>TECHNOLOGY OF INFORMATION</u> is quite another thing:

- It's unleashing the POWER OF THE TECHNOLOGY OF INFORMATION once it's made available
- It is the fundamental necessity for the success of deregulation







Manage & Understand the Information

In Energy Deregulation this means that the technology exists to manage and understand energy, energy requirements, the power grid...

We know how to get through the complexities tariff structure.

of the

- Capacity adjustment is not a problem.
- Nor is Load Profiling, Fuel Switching, Control, Bill Consolidation, Processing.

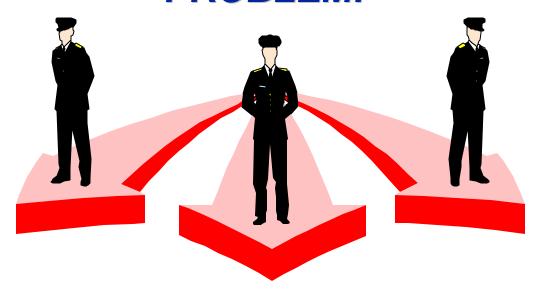
Lighting Reconciliation and





What Stops the Process

But there is a PROBLEM!



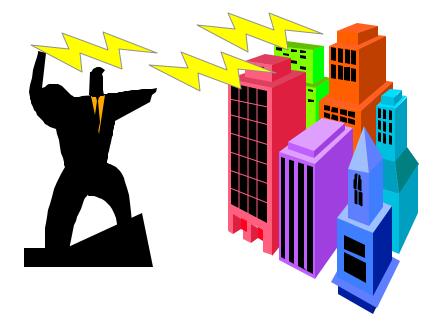




The User Must Have Access

The <u>USER or customer</u> must duplicate or have access to all the technology behind the information.

With deregulation, the user must try to develop,
 comprehend and use the identical information in order to operate







The Transfer Must Take Place

The TECHNOLOGY OF INFORMATION must SHIFT to the USER

This shift of information needs to be managed

understood and

 It will take a concentrated effort before becomes <u>basic to everyday operations</u>. this shift





New Partnerships Must Be Made

With Deregulation, providers and users must grow into new expectations, new partnerships and new results.

- It will take time
- It will never be efficient if each user must create its own expertise, its own critical mass, its own energy infrastructure.





A Change in Understanding Deregulation

It's not just electrons or sparks or kilowatts or therms, but it is the MANAGEMENT of them.

Bringing about that transfer requires

a fundamental change in understanding deregulation

and the expectations involved in deregulation --- as well as

a change in the relationships themselves.



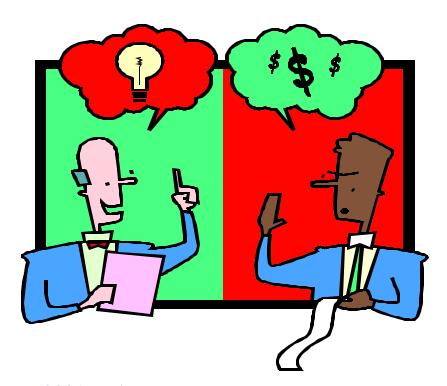




Users Who Are Also Partners

The Technology of Information means New Relationships

Users and vendors must begin to view each other differently, as PARTNERS in the process of managing energy.





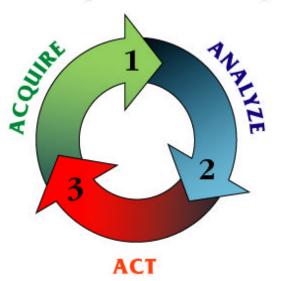


The Three Vital Principles

Three Vital Principles in Assisting This Technology Shift

The Optimizer Loop

- Acquiring Needed Informati
- Analyzing it and then..
- Taking Action





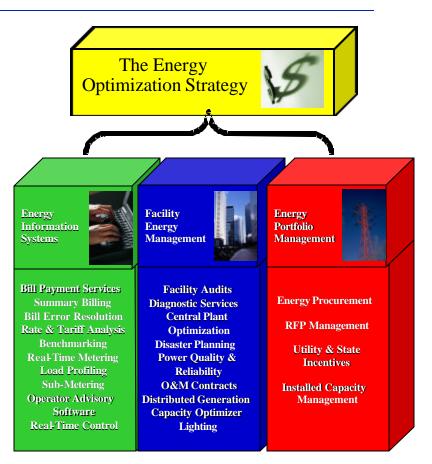


The Three Components of Energy Management

These three components need to be applied to every segment of the energy portfolio

The Optimization Strategy

 Using the Technology of Information to optimize each activity







Establishing the Strategic Relationship

Optimizing functional value between all parties:

- Energy Information System
- Commodity portfolio management
- Facilities Management

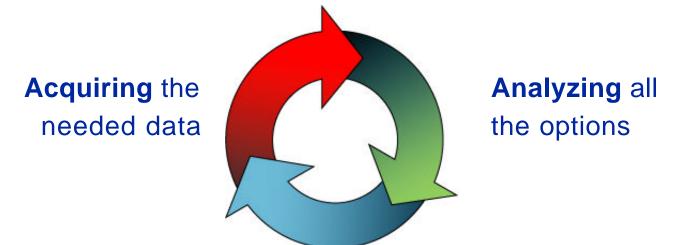






Optimization to Create New Relationships

The KEY to Responding to the Energy User Needs



Migrating the Technology of Energy Information **To Action**





Great Day for the Energy Industry

Summary--

Deregulation Requires:

More understanding + New relationships + A Transfer of Information = New Results





Start Right Now!

Define and Develop New Partnership Relationships

Transfer the information. <u>Use it.</u>
Get results for the complete energy portfolio.







Energy Deregulation Opportunities

The Optimizer Loop



